

#### United States Department of the Interior

NATIONAL PARK SERVICE Blue Ridge Parkway 199 Hemphill Knob Road Asheville, North Carolina 28803

L7617 PIN 737

# FINDING OF NO SIGNIFICANT IMPACT OTTER CREEK BRIDGE AND CAMPGROUND SERVICES REPLACEMENT PROJECT

### Virginia Blue Ridge Parkway USDI, National Park Service

#### **INTRODUCTION**

The National Park Service (NPS) has prepared an environmental assessment (EA) that evaluates the proposed replacement of the existing Otter Creek Bridge and Campground services at milepost 60.8 on the Blue Ridge Parkway, Amherst County, Virginia. The project also includes the relocation of the Campground kiosk and sewer, electric, and water lines for the concession-operated restaurant facility; reconstructing the access road to the kiosk and the stone retaining wall behind the restaurant facility; and restoring and stabilizing the banks of Otter Creek in the project area. These actions are being proposed to eliminate safety hazards and risks to visitors of the Campground and facilities, protect the Park's structures from flood damage and failure, eliminate erosion in the project area, improve water quality of Otter Creek, and provide a more enjoyable experience for the Park's visitors.

Three to four times per year, a rainfall event occurs that is significant enough to cause flooding in the area. Once the flooding starts, debris is washed downstream. Because of the design of the existing bridge, the debris is trapped under the bridge, creating a "dam." This "dam" causes the water to backup and spill over the bridge, piling debris up against the bridges guardrails. The water then is diverted around the end of the bridge, causing the floodwaters to leave the natural channel, resulting in significant erosion. Otter Creek Bridge is the only means of ingress and egress to the Otter Creek Campground. Whenever a rainfall event is significant enough to present a threat of flooding, all visitors are required to leave the Campground before the bridge is flooded. Flooding threatens the life of anyone not made to evacuate and any property that is left behind.

The continuous erosion of the stream banks and displacement of debris from the high water is undermining the foundations of the concessions facility/restaurant, and is compromising the structural integrity of the Otter Creek Bridge abutments. The floodwaters overflow the stream bank on the west side of the bridge, causing scouring and erosion behind the restaurant. A large scour hole has resulted from continued bank erosion behind the restaurant, and is encroaching on the restaurant. At the current rate of erosion (based on current weather trends), major failures in these structures could be expected in three to five years.

Damage has occurred to the outdoor patio area used by the concessionaire as an outdoor dining area. Erosion had undermined the patio area to a point that it was extremely unsafe and resulted in the loss of the adjacent retaining wall foundation. Due to these safety risks, the exterior patio was closed and removed in 2001. Although no floodwaters have actually damaged the concessions building itself, documentation shows that the water has reached the structure. Floodwaters have reached the Campground entrance station/kiosk and have caused damage, including saturation of the carpeting and interior woodwork. The diverted floodwaters also spill into a sanitary sewer manhole, flooding the sewage treatment system causing untreated wastewater to be released into Otter Creek. This is a direct threat to public health and severely impacts these trout waters and other wildlife habitat.

Undercut banks have developed where floodwaters overflow the stream banks, which have caused the loss of trees and other vegetation in the riparian area. In addition, the recurring washouts have increased sedimentation in Otter Creek, altering its characteristics and affecting the aquatic life in the stream. This sediment continues to settle out in Otter Lake, changing the characteristics of the lake and the aquatic life therein.

The NPS has prepared this EA in accordance with the National Environmental Policy Act (NEPA) of 1969 (42 United States Code 4321 et seq.), the Council on Environmental Quality (CEQ) regulations (40 Code of Federal Regulations 1500 through 1508) for implementing NEPA, and the NPS NEPA compliance guidance handbook (Director's Order (DO)-12, Conservation Planning, Environmental Impact Analysis, and Decision-making).

#### PREFERRED ALTERNATIVE

The NPS has chosen to select the Preferred Alternative (Alternative B) from the EA, which is to replace the Otter Creek Bridge, relocate the Campground kiosk and utility lines for the concession-operated restaurant facility, reconstruct the access road to the kiosk and the stone retaining wall behind the restaurant facility, and restore and stabilize the banks of Otter Creek in the project area. The mitigations and other features of Alternative B evaluated in the EA substantiate features of this decision.

As part of the Preferred Alternative, the existing concrete bridge deck (25 feet by 22 feet), bridge handrails, and fee collection booth (kiosk) would be demolished, and the phone and sewer lines attached to the bridge deck would be removed. Demolition and removal of the existing Otter Creek Bridge would be conducted to minimize impacts on the streambed. A 75-foot by 26-foot new bridge would be constructed at the existing bridge site, and would have an arched shape to allow floodwaters of Otter Creek to flow under the bridge. The new Otter Creek Bridge would

be constructed at a higher elevation (approximately 2.5 to 3 feet higher in elevation than the existing bridge deck). A hydrological study would be conducted as part of this action. The existing bridge footing may be used to construct the new bridge, but only after a structural inspection is performed. Included with bridge construction would be the installation of a new concrete walk with an aluminum handrail on the west side of the bridge, and a new concrete barrier curb on the east side. During the time the existing bridge is removed and the new bridge is under construction, the Otter Creek Campground would be closed to visitors, since there is no alternative access.

The sewer, electric, and water lines for the concession-operated restaurant facility would be relocated under Alternative B. Approximately 210 linear feet of underground single-phase primary electrical service to the concessions operations would be installed through the new bridge. The electrical pole located to the west of the bridge, adjacent to the existing kiosk, would be removed under this alternative. Between the restaurant facility and the bridge, and between the bridge and the electrical pole on the eastern side of the bridge, electrical wiring would be run underground to required trenching and backfill specifications to meet electrical codes. The electrical wiring would run through a conduit embedded within the concrete of the new bridge. The overhead power line would be removed from view to the restaurant or its parking area.

A new sewer line connecting the Otter Creek Restaurant to the Otter Creek Campground sewer system would be constructed over Otter Creek. Approximately 180 feet of sewer line would run under the new Otter Creek Bridge. Since the new bridge would be elevated, a lift station would need to be constructed to pump sewage through the system. This new lift station would have two 3-Hp pumps, a manhole/holding tank, electrical controls, and alarms in the Campground.

The NPS also proposes to relocate the existing Campground fee collection booth/kiosk out of the floodplain of Otter Creek. The kiosk would be relocated from its existing location near the bridge to a site near the Campground entrance, in close proximity to the existing kiosk. This area would no longer be subject to flooding with the raising of Otter Creek Bridge. To avoid and minimize tree removal, the kiosk would be located perpendicular to the entrance road. A parking pull-off for registering vehicles dimensioned approximately 120 feet long by 12 feet wide would be located adjacent to the access road. This pull-off would be constructed with minimal disturbance to trees, and would require minimal site grading. The existing service road to the restaurant, and the existing asphalt walk located between the service road and the kiosk, would remain. This location is the best suited to lessen vehicle backup during registration, and vehicle backup would be less likely to impede entrance into the concessions parking area. Underground electrical and phone service to the kiosk would be installed.

The existing stone retaining wall located behind the Otter Creek concessions facility would also be reconstructed. Reconstruction would consist of repairing and adding to the existing stone wall west of the Otter Creek Bridge, where erosion has occurred. After the retaining wall is reconstructed, the eroded areas would be backfilled with riprap and stone and covered with a layer of topsoil. The eroded drainage swale behind the restaurant would also be stabilized and restored with native vegetation. All disturbed areas would be revegetated with native plant species.

#### **ALTERNATIVES CONSIDERED**

The EA analyzed two alternatives, including Alternative A, the No Action alternative, and Alternative B, the Preferred Alternative. Under the No Action alternative, the Otter Creek Bridge would not be replaced, the kiosk and Park utilities would not be relocated, and no changes to the access road would be made. The failing stone retaining wall behind the Otter Creek concessions facility/restaurant would also not undergo repairs.

#### ENVIRONMENTALLY PREFERRED ALTERNATIVE

The environmentally preferred alternative is determined by applying the criteria suggested in NEPA, which is guided by the CEQ. The CEQ provides direction that "the environmentally preferable alternative is the alternative that will promote the national environmental policy as expressed in NEPA (Section 101(b))." The six NEPA goal statements include:

- (1) Fulfill the responsibilities of each generation as trustee of the environment for succeeding generations;
- (2) Assure for all Americans safe, healthful, productive, and esthetically and culturally pleasing surroundings;
- (3) Attain the widest range of beneficial uses of the environment without degradation, risk to health and safety, or other undesirable and unintended consequences;
- (4) Preserve important historic, cultural, and natural aspects of our national heritage, and maintain wherever possible, an environment which supports diversity and variety of individual choice:
- (5) Achieve a balance between population and resource use which will permit high standards of living and a wide sharing of life's amenities; and
- (6) Enhance the quality of renewable resources and approach the maximum attainable recycling of depletable resources.

Following environmental analysis, the environmentally preferred alternative is the alternative that causes the least damage to the biological and physical environment or that best protects and enhances the natural, historic, and cultural resources of the site. Alternative A would not contribute to meeting any of the six NEPA goals. Conversely, Alternative A would detract from meeting every goal. Alternative B would contribute to meeting all six NEPA goals in the project area. Therefore, Alternative B would be the environmentally preferred alternative.

## WHY THE PREFERRED ALTERNATIVE WILL NOT HAVE A SIGNIFICANT EFFECT ON THE HUMAN ENVIRONMENT

As defined by 40 CFR 1508.27, significance is determined by examining the following criteria:

Impacts that may be both beneficial and adverse: Temporary to short-term, negligible to minor, localized, adverse impacts on soils, water quality, aquatic species and habitats, vegetation, terrestrial wildlife, and air quality would occur during construction under the Preferred Alternative, with implementation of mitigation measures. However, long-term, moderate to major, beneficial impacts on soils, water quality, vegetation, and wildlife, including aquatic

species, would result from Alternative B. In addition, long-term, beneficial, cumulative impacts on these resources would occur. Although the Preferred Alternative would have short-term, negligible (due to mitigation measures), adverse effects on the Otter Creek floodplain during construction, the natural resources and functions of the floodplain would be protected and restored over the long-term.

Only temporary, negligible, adverse impacts on the visual quality of the project site and on transportation (from a slight increase in truck and other construction traffic and slows on nearby roads) would occur during construction under the Preferred Alternative. No adverse effects on historic properties, archaeological resources, visitor use and experience, recreation, economics, and utilities and public services would result from Alternative B.

Over the long-term, Alternative B would have moderate to major, beneficial impacts on visitor use and experience, recreation, visual resources, and economic and social conditions at the Otter Creek Campground, and minor, localized, beneficial impacts on utilities and public services. Long-term, moderate to major, localized, beneficial impacts on transportation and access would also occur under this alternative.

Degree of effect on public health and safety: Although the Preferred Alternative would have temporary, negligible, localized, adverse impacts on public and worker health and safety (from storage, handling, and use of equipment and during construction activities), long-term, major, beneficial impacts on visitor and employee health and safety are anticipated due to eliminating the potential for flooding and the need for evacuation of the Park, and from reducing the potential for discharges of raw sewage from the sewage system. This alternative would be in compliance with NPS Management Policies for ensuring visitor safety.

Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetlands, wild and scenic rivers, or ecologically critical areas: As discussed in the EA, there are no prime farmlands, wetlands, wild and scenic areas, or ecologically critical areas that would be affected by implementation of the Preferred Alternative. In addition, the project would not directly, indirectly, or cumulatively affect historic and cultural resources.

Degree to which effects on the quality of the human environment are likely to be highly controversial: There were no highly controversial effects identified during either preparation of the EA or the public review period.

Degree to which the possible effects on the quality of the human environment are highly uncertain, or involve unique or unknown risks: There were no highly uncertain or unique or unknown risks identified during preparation of the EA or the public review period.

Degree to which the action may establish a precedent for future actions with significant effects or represents a decision in principle about a future consideration: If the Preferred Alternative is implemented, the outdoor patio area at the Otter Creek concessions facility/restaurant will likely be reconstructed in the future and reopened to diners at the facility. In addition, if the stream banks of Otter Creek are stabilized, and stream bank wash out mitigated, the NPS will likely

undertake landscaping in the project area, which may include planting trees and restoring riparian vegetation. These future activities would not result in significant adverse effects on the natural or human environment; overall environmental effects would be beneficial. The Preferred Alternative would not represent a decision in principle about a future consideration.

Whether the action is related to other actions with individually insignificant, but cumulatively significant, impacts: As described in the EA, the action is not related to other actions with individually insignificant but cumulatively significant impacts.

Degree to which the action may adversely affect districts, sites, highways, structures, or objects listed on National Register of Historic Places or may cause loss or destruction of significant scientific, cultural, or historical resources: In accordance with Section 106 of the National Historic Preservation Act, a cultural resources investigation was conducted in the project area and consultation and comment were solicited from the Virginia State Historic Preservation Officer (SHPO). As discussed in the EA, no archaeological artifacts and/or features were observed or recovered during the archaeological evaluation. In addition, no historic properties or cultural landscapes would be affected by implementation of the Preferred Alternative.

After applying the Advisory Council on Historic Preservation's criteria of adverse effects (36 CFR Part 800.5, *Assessment of Adverse Effects*), the NPS concludes that implementation of the Preferred Alternative would have *no adverse effect* on cultural resources at Otter Creek Campground. The Virginia SHPO concurs with the Park's finding of No Adverse Effect on cultural resources.

Degree to which the action may adversely affect an endangered or threatened species or its critical habitat: The United States Fish and Wildlife Service (USFWS) and the Virginia Department of Conservation and Recreation (VDCR) were contacted regarding potential impacts of the project on natural heritage resources, including rare, threatened, or endangered plant and animal species. Surveys of the project site did not result in the discovery of any Federal or Statelisted threatened or endangered plants or animals, and none would be affected by the Preferred Alternative. In addition, the Park database has no records of Federal or State-listed plant or animal species from the Otter Creek Campground or adjacent area, and no such species would be affected by the project. These findings were confirmed in a response letter from the VDCR, Division of Natural Heritage dated March 17, 2003. The USFWS had no comment on the project, and it was determined that no formal Section 7 consultation was necessary.

Whether the action threatens a violation of Federal, State, or local environmental protection law: The implementation of the Preferred Alternative violates no Federal, State, or local environmental protection laws.

#### **IMPAIRMENT**

In addition to reviewing the list of significance criteria, the NPS has determined that implementation of the Preferred Alternative will not constitute an impairment to the Blue Ridge Parkway's resources and values. This conclusion is based on a thorough analysis of the environmental impacts described in the EA, the public comments received, relevant scientific

studies, and the professional judgment of the decision-maker guided by the direction in NPS 2001 Management Policies (December 27, 2000). As described in the EA, implementation of the Preferred Alternative will not result in major, adverse impacts to a resource or value whose conservation is (1) necessary to fulfill specific purposes identified in the establishing legislation or proclamation of the Blue Ridge Parkway; (2) key to the natural or cultural integrity of the Park or to opportunities for enjoyment of the Park; or (3) identified as a goal in the Park's general management plan or other relevant NPS planning documents.

#### **MITIGATION**

Mitigation measures were analyzed as part of the action alternative. Mitigation measures have been designed to minimize, reduce, or eliminate the impacts from proposed activities under the Preferred Alternative (Alternative B). These measures are listed below.

Mitigation Measures By Resource Area		
Resource Areas	Mitigation Measure	
Soils, Water Resources, and Vegetation and Wildlife	<ul> <li>The NPS would require the construction contractor to comply with the Virginia Erosion and Sediment Control Law, Regulations, and Certification Regulations codified at Title 10.1, Chapter 5, Article 4 of the Code of Virginia to avoid and minimize erosion and sediment runoff to Otter Creek during construction, and follow State Erosion and Sediment Control Program guidance provided in the Virginia Erosion and Sediment Control Handbook. NPS would monitor construction activities to make certain that erosion and stormwater management practices are in place and adequately preventing sediment and pollutant migration into nearby surface waters.</li> <li>The NPS would require the construction contractor to stage any equipment in the large grassy area outside the floodplain of Otter Creek at the intersection of the Campground access road and the Blue Ridge Parkway to minimize adverse effects from soil compaction.</li> <li>Construction would not be conducted when soils are wet to minimize or eliminate the potential for compaction.</li> <li>As few trees as possible should be removed during this project to protect riparian areas and to reduce the amount of ground disturbance that would allow exotic vegetation to become established.</li> <li>Disturbed areas would be reseeded using Parkway standard seed mixes (Guidelines for Seeding and Rehabilitation).</li> <li>The NPS would require the construction contractor to prohibit equipment from entering Otter Creek during construction. If in-stream work is unavoidable, the NPS would require the construction contractor to use synthetic mats to protect the stream.</li> <li>In accordance with Virginia Department of Environmental Quality (VDEQ) recommendations (see Appendix E), the NPS would require the construction contractor to develop a spill response plan and to keep materials such as granular absorbents or booms on-site during construction to quickly respond to any release. Any discharge of such products would be reported to the VDEQ, South Centr</li></ul>	

	<ul> <li>No waste materials, such as oil, would be allowed to be disposed of in storm or sanitary drains or to be washed into streams.</li> <li>To reduce fugitive dust emissions during construction, the NPS would require the construction contractor to use control methods outlined in 9 VAC 5-50-60 <i>et seq</i>. of the Regulations for the Control and Abatement of Air Pollution. These include, but are not limited to: applying water or chemicals to suppress dust, washing down construction vehicles and paved roadways immediately adjacent to the construction site, installing and using hoods, fans, and fabric filters to enclose and vent the handling of dusty materials, and covering open equipment for conveying materials.</li> <li>If project activities include the burning of construction or demolition material, the NPS would ensure that the contractor complies with the requirements under 9 VAC 5-40-5600 <i>et seq</i>. for open burning.</li> </ul>
Visitor Use and Experience/ Recreation	The NPS would request that construction of the fee collection booth and road repaving/pull-off widening be constructed simultaneously with the bridge construction
Waste Management	<ul> <li>All fuel, construction materials, fuel handling, and equipment storage must occur outside the floodplain of Otter Creek. Leaking vehicles and equipment would not be permitted in the floodplain, and such vehicles would require immediate attention.</li> <li>No waste materials, such as oil, would be allowed to be disposed of in storm or sanitary drains or to be washed into streams.</li> <li>The NPS would require that the construction contractor test any soil or sediment suspected of contamination or generated wastes and dispose of them in accordance with applicable Federal, State, and local laws and regulations.</li> <li>The NPS would require the contractor to check all structures to be demolished for the presence of asbestos-containing materials and/or lead-based paint. If any are found, the NPS would ensure that, in addition to Federal waste-related regulations, State regulations 9 VAC 20-80-640 and 9 VAC 20-60-261 are followed.</li> <li>The NPS would require the contractor to reduce at the source, reuse, or recycle all solid wastes generated from the project.</li> </ul>
Noise, Human Health and Safety, and Transportation	<ul> <li>The NPS would request that construction of the fee collection booth and road repaving/pull-off widening be constructed simultaneously with bridge construction to minimize campground closure.</li> <li>The NPS would require the construction contractor to install and maintain all required signage per the <i>Manual on Uniform Traffic Control Devices</i> around the construction site and around road closures.</li> <li>The NPS would require the construction contractor to install and maintain barricades or fences around the construction site to prevent non-contractors and the public from entering the construction area.</li> <li>The NPS would require the construction contractor to post construction warning signs to notify users of the Otter Creek Campground and facilities of the construction site and dangers at the site.</li> <li>The NPS would submit all plans and specifications for any on-site (no discharge to state waters) disposal system to the Virginia Department of Health for review and approval. (Plans and specifications for any system resulting in a discharge of treated wastewater to surface waters will need to be submitted to the VDEQ, South Central Regional Office.)</li> <li>The NPS would require the contractor to use watertight covers for any manholes located within a floodplain and to locate the pump station outside floodplain or protect it from flooding.</li> </ul>

#### PUBLIC INVOLVEMENT

To ensure that the Park and its programs are coordinated with the programs and objectives of State, Federal, and local governments and private organizations, it is the Park's objective to work with these agencies and organizations during the planning process. Consultation and coordination have occurred with numerous agencies during the preparation of this EA. On February 24, 2003, the Blue Ridge Parkway Superintendent mailed a scoping notice announcing the project proposal, notified interested parties where more information could be obtained, and invited their review comments. The scoping comment period lasted 30 days.

As a result of the scoping effort, two responses were elicited. All comments received in response to the scoping notices have been duly considered and will remain in the project record throughout this planning process.

A copy of the EA was sent to all persons who requested a copy, as well as to other pertinent agencies and individuals potentially affected by the Preferred Alternative. The EA was also sent to all NPS employees along the Blue Ridge Parkway. A public notice/news release was published in local newspapers in Amherst, Roanoke, Rockbridge, Botetourt, and Bedford, announcing the availability of the EA and requesting public and agency comments on the EA. In addition, the EA was posted and available for review on the Internet at http://www.nps.gov/blri/pphtml/facts.html. This EA was available for public review for 30 days, which ended August 1, 2003. Thirteen letters/written comments were received in response to this public review, the majority of which provided additional recommendations to further minimize resource damage during implementation of the Preferred Alternative. In response to these comments, the NPS incorporated these additional mitigation measures into the EA, and will implement the measures as part of the project.

One issue was received during the public review process from the Virginia Department of Game and Inland Fisheries that required resolution by the NPS:

Issue #1: "Otter Creek is a stocked trout stream. We recommend that the Park Service coordinate with our local fisheries biologist to prevent construction/stocking conflicts. We also recommend conducting in-stream activities during low-flow conditions, using non-erodible cofferdams to isolate the construction area, blocking no more than 50% of stream flow at any given time, stockpiling excavated material in a manner that prevents reentry into the stream, restoring original streambed and stream bank contours, revegetating barren areas, and implementing strict erosion and sediment control measures throughout the project period as described in the Virginia Erosion and Sediment Control Handbook, 1992, Virginia Department of Conservation and Recreation."

NPS Response #1: In response to this comment, Bambi Teague, Chief, U.S. Department of the Interior, NPS, Blue Ridge Parkway Headquarters, Branch of Resource Management, contacted Bud LaRoche at the Virginia Department of Game and Inland Fisheries on August 19, 2003, and was informed that the Virginia Department of Game and Inland Fisheries does not stock Otter

Creek. Therefore, there should be no trout stocking conflicts from implementation of the Preferred Alternative.

#### **CONCLUSION**

In consideration of the comments received throughout the planning process, careful review of potential resource and visitor impacts, and developing appropriate mitigation to protect resources, the Preferred Alternative best strikes a balance between the widest range of use and enjoyment of the Blue Ridge Parkway without degradation of the environment or risk of health or safety.

The Preferred Alternative does not constitute an action that normally requires preparation of an environmental impact statement (EIS). The Preferred Alternative will not have a significant effect on the human environment. Negative environmental impacts that could occur are minor and temporary in effect. There are no unmitigated adverse impacts on public health, public safety, threatened or endangered species, sites or districts listed in or eligible for listing in the National Register of Historic Places, or other unique characteristics of the region. No highly uncertain or controversial impacts, unique or unknown risks, significant cumulative effects, or elements of precedence were identified. Implementation of the action will not violate any Federal, State, or local environmental protection law.

Based on the foregoing, it has been determined that an EIS is not required for this proposed project on NPS lands, and thus, will not be prepared. Implementation may take place immediately after the date of this decision.

Recommended: Superintendent, Blue Ridge Parkway

Approved: W. A. Willow, Acting 9/8/03

Regional Director, SERO

Plant 9/8/03

Date